



# Relationship Between Stressors and Coping Strategies in Iranian Patients Undergoing Hemodialysis

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## Abstract

**Background:** Living with hemodialysis is a permanent challenge due to the need for adaptation to the treatment plan, related complications, and dietary constraints. Therefore, the quality of life in such patients is influenced by physical and psychological stressors posed by these challenges.

**Objectives:** The aim of this study was to investigate the relationship between stressors and coping strategies in hemodialysis patients, Qazvin, Iran.

**Methods:** A descriptive cross-sectional correlational design was used to investigate the relationship between physiological and psychosocial stressors and coping strategies among Iranian patients undergoing hemodialysis in 2018. Samples consisted of 140 patients recruited through the simple random sampling method from a large referral hemodialysis center affiliated to Qazvin University of Medical Sciences, Iran. A demographic variables form, hemodialysis stressors scale (HSS,) and Ways of Coping Scale- revised (WOCs-R) were employed for data collection. SPSS version 24 was used for data analysis.

**Results:** The majority of the patients (49.2%) had moderate and 3.6% of them had severe physiological stressors. With regard to psychosocial stressors, 51.4% had moderate and 3.6% of the participants had severe stressors. The majority of the participants used “distancing” strategies. Pearson’s correlation showed that strategies of escape avoidance and physiological stressors had a significant positive correlation ( $r = 0.2, P = 0.004$ ), and strategies of problem solving ( $r = 0.2, P = 0.01$ ), escape avoidance ( $r = 0.3, P = 0.000$ ), and self-control ( $r = 0.1, P = 0.03$ ) had a significant positive correlation with psychosocial stressors.

**Conclusions:** The majority of the hemodialysis patients had moderate to severe stress in physiological and psychosocial dimensions. They often used negative strategies for coping with stressors. The above-mentioned challenges are considered as risks to patients’ well-being and require the attention of policy-makers and managers to provide comprehensive and high-quality services.

**Keywords:** Coping Strategies, Stressors, Hemodialysis, Iran

## 1. Background

The most remarkable event in human societies and healthcare systems in the 21st century is the spread of chronic diseases. For instance, chronic renal failure is one of the most common chronic diseases in human societies (1). The number of people with renal failure is increasing annually (2). According to the available statistics in Iran, 1200 - 1600 people are added annually to the number of patients suffering from chronic renal failure (3). End-stage renal disease (ESRD) is the result of chronic renal failure. It is an irreversible clinical condition in which the patient needs alternative renal therapies to avoid uremia (4). In

this regard, the head of the Department of Transplantation and Special Diseases in the Ministry of Health reported that the growth rate of patients with kidney diseases in Iran during the last 10 years has been 14% and dialysis patients’ growth rate has been 12% (5). Currently, 450000 patients are suffering from ESRD in the United States (6). This figure will increase up to 2.24 million people by 2030 (7). In Iran, the incidence of ESRD is about 22.6%. As a result, 4000 new cases of ESRD are added to previous numbers annually (8).

Hemodialysis is intended to replace renal function in both acute and chronic renal failure patients (9). Living